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The Northern Gateway and Keystone XL Pipelines: A Framework for
Analyzing Interjurisdictional Pipeline Disputes

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Capstone Executive Summary

The purpose of this capstone report is to establish a framework for analyzing interjurisdictional pipeline disputes. This is an important issue to examine because pipeline transportation has become of key importance in the oil and gas industry, given its cost-effectiveness and ability to reach difficult to access, unconventional sources of oil. However, when pipelines cross multiple jurisdictions disputes may arise, and these disputes may be of an economic, legal or political nature.

This report sets up the framework by using the Northern Gateway pipeline and Keystone XL pipeline disputes as examples. The economic importance of both projects is discussed, followed by discussion on how feasible it is to substitute the pipeline projects with alternative means of transportation. It becomes evident that the economics of pipelines boils down to netbacks, which is essentially revenue going to producers minus all costs associated with getting a barrel of oil to market. Then, the legal issues concerning the pipeline approval process are considered, as well as how these issues may halt the approval of interjurisdictional pipelines. This is followed by a discussion on how the politics of pipelines affect the approval process. It becomes evident that pipeline disputes arise because of a lack of coordination of laws, regulations, and both economic and political interests.

Table of Contents

I. Introduction: Importance of pipelines	2
II. Cross-border pipelines	4
III. Northern Gateway and Keystone XL Pipelines: The facts and figures	5
IV. Economic issues	7
A. Current economic situation in the oil and gas sector in Canada and the US	9
B. Economic importance of the pipeline projects	12
C. Substitutability	16
D. Tariffs and taxation	21
V. Legal issues	23
A. Pipeline jurisdiction and approval process in Canada	24
B. Pipeline jurisdiction and approval process in the United States	29
VI. Political Issues	34
A. Northern Gateway: Federal Government opinion and prerequisites for approval	34
B. Keystone XL: Federal government opinion and prerequisites for approval	38
VII. Conclusion	C 40
Bibliography	42

I. Introduction: Importance of pipelines

Access to natural resource markets is important for land-locked jurisdictions, given that resources cannot be exported if they are unable to reach markets where they are demanded. This is especially true in the oil and gas industry, an industry that must rely on methods of transportation such as pipelines, railways, trucks and barges to transport the oil and gas to refineries and their ultimate destination. However, transporting oil from origin to market raises both logistical and cost concerns, because transporting oil costs money.

Pipelines are becoming an increasingly important means of transporting oil as conventional crude oil reserves are depleted. Conventional oil production peaked in the 1970s, but there is still an abundance of unconventional oil to be had.¹ As a result of their “inaccessible placements and unusual compositions,”² unconventional oils are both more difficult and more expensive to obtain and transport than conventional oils. As one of the most cost-effective³ means of transportation, pipeline infrastructure is becoming increasingly important in transporting unconventional oil.

However, when pipelines cross multiple jurisdictions, disputes may arise. This is evidenced by the efforts of Enbridge Inc. and TransCanada Corporation, two Alberta-based companies, to construct pipelines that originate in Alberta but

¹ Gordon, Deborah. May 2012. “Understanding Conventional Oil.” *Carnegie Endowment for Global Peace*, page 2

² “Understanding Conventional Oil,” page 5

³ Karangwa, Eugene. 2008. *Estimating the Cost of Pipeline Transportation in Canada*. Transport Canada, page 13

terminate in another jurisdiction. The nature of the pipeline disputes may be political, or of an economic or environmental nature, or because the parties involved have different priorities or goals. For example, the Northern Gateway pipeline dispute is precipitated by the fact that British Columbia’s priority is to ensure that the pipeline does not have negative environmental impacts. Alberta’s goal in the construction of the pipeline is to obtain royalty revenues.

This paper sets out a framework for analyzing interprovincial and international pipeline disputes, in terms of legal, political and economic issues. First, the economic importance of the projects will be discussed, followed by an examination of the feasibility of alternative methods of transportation. Next, the legal issues associated with a pipeline spanning two separate jurisdictions will be discussed, in addition to the intricacies of the approval process. Lastly, the political issues of constructing a cross-border pipeline will be examined. In setting up the framework, the questions outlined in Table 1 below will be examined.

Table 1: Framework questions
Economic issues
<ul style="list-style-type: none"> - Why are the projects important to the parties involved? How do the projects affect netbacks? - How feasible is it to substitute the proposed pipelines for alternative methods of transportation? How does this affect netbacks? - Can parties involved impose taxes or levies the proposed pipeline projects?
Legal issues
<ul style="list-style-type: none"> - Who has the jurisdiction to approve the proposed pipeline project? - What does the approval process for a proposed pipeline project entail?
Political issues

- What is the federal and provincial (or state) government's opinion on the proposed project?
- How does federal government opinion reflect the origin of the dispute?
- Have the provincial, federal or state governments set out any prerequisites for approval?

It will become clear that cross-border pipeline disputes are indicative of a problem of coordination of laws, interests and regulations.

II. Cross-border pipelines

A cross-border pipeline is one that has "its origin (at either the wellhead or the interconnect to another pipeline system) in one nation and that traverses one or more other nations along its route."⁴ Cross-border pipelines are governed by the laws and regulations of multiple jurisdictions, and therefore "require a unique balancing of local laws and international considerations."⁵ A cross-border pipeline may be established in one of two ways. Firstly, the pipeline could be comprised of lengths of domestic pipelines. Together, these domestic pipelines make up the entire pipeline system. The series of connected pipelines will be governed by the legislation and rules in the specific jurisdiction that it is located in. This means that the different operating parties must agree to transport agreements for "each sector of transit."⁶ The second alternative is to build a pipeline that is unified with common ownership and agreed upon transport terms. These terms will be regulated not only by domestic laws and contracts, but also by international laws. Regardless of which

⁴ Dunlany, Michael, and Robert Merrick. "Legal Issues in Cross-Border Oil and Gas Pipelines." *J. Energy & Nat. Resources* 23, no. 3 (2005): 247-265, page 247

⁵ "Legal Issues in Cross-Border Oil and Gas Pipelines" page 248

⁶ "Legal Issues in Cross-Border Oil and Gas Pipelines." page 247

structural model is chosen for the pipeline, issues surrounding the operation of the pipeline may arise.

III. Northern Gateway and Keystone XL Pipelines: The facts and figures

Alberta is situated on the Western Canada Sedimentary Basin (the Basin). The Basin has an abundance of hydrocarbons, including natural gas, conventional oil, and bitumen extracted from oil sands,⁷ and produces more oil than it consumes. There is therefore a net surplus of oil in Alberta, and there are royalty revenues to be made by exporting oil to jurisdictions that demand it. Pipelines are “essential to Alberta – and generally speaking to any oil-producing area where marine transportation is not an immediate option – if it is to take advantage of international trade opportunities.”⁸ Oil producers in the province depend upon exports to high-demand markets, which is crucial for Alberta’s “economic health”⁹ in that oil exports create netbacks for producers (sales revenues net of all costs associated with getting the oil to market).

Two Alberta-based companies have proposed pipeline projects aiming to connect Alberta’s oil sources with the coast. Enbridge has proposed the construction of the Northern Gateway pipeline, granting Enbridge access to an export terminal in Kitimat. The proposed Northern Gateway pipeline route is to span 1,172 km,

⁷ Government of Alberta. “Energy Economics Understanding Royalties.” 2010, 18. *Trade Statistics*. September 19, 2012. http://www.international.alberta.ca/documents/Alberta_Half_Year_2012_Charts.pdf (accessed May 25, 2013).

⁸ Frigon, Mathieu; Perreault, Francis. (April 23, 2012) “The Economics of North American Pipeline Projects: The Race to the Sea.” *Library of Parliament Background Paper* page 3

⁹ “The Economics of North American Pipeline Projects: The Race to the Sea,” page 3

originating in Hardisty, Alberta and ending at a marine terminal located in Kitimat, British Columbia. The pipeline would have the capacity to transport 525,000 barrels of oil per day (bpd.)¹⁰

TransCanada has plans to build the Keystone XL pipeline, connecting Alberta's oil supply to the US Gulf Coast. Once completed, the entire system will consist of four distinct segments, spanning a total of 8,032km, and with a capacity to transport close to 590,000 bpd.¹¹ The Keystone Pipeline System is being constructed in four phases. Phase I originates in Hardisty, Alberta and ends in Patoka, Illinois, with a connection through Steele City, Nebraska. This section of the pipeline began its operations in June, 2010. Phase II is an extension of the pipeline system from Steele City to Cushing, Oklahoma, and commenced its operations in February 2011. Phase III of the pipeline is meant to expand the system to the Gulf Coast from Cushing, Oklahoma. Construction on Phase III of the pipeline commenced in February 2012. Phase IV, known as the Keystone XL pipeline, is an alternative route to Steele City, also originating in Hardisty but taking a shorter route to Steele City through Montana.¹² Keystone XL will span 529km in Canada, and 1,368km in the U.S., and is expected to cost around USD\$5.3 billion to construct.¹³ While the other three Phases were met with little opposition, the Keystone XL pipeline has proven to be quite contentious.

¹⁰ Eglington, P., R. Mansell, J. Ruitenbeek, and R. Schlenker. *Public Interest Benefit Evaluation of the Enbridge Northern Gateway Pipeline Project: Update and Reply Evidence*. Calgary: Wright Mansell Research Ltd., 2012, 148., page 17

¹¹ TransCanada. *Keystone Pipeline*. May 13, 2013. <http://www.transcanada.com/100.html> (Accessed June 10, 2012)

¹² TransCanada. *Keystone XL Pipeline Project*. 2013. <http://keystone-xl.com/#sthash.HdayABrY.dpuf> (Accessed July 1, 2013)

¹³ *Keystone XL Pipeline Project*.

IV. Economic issues

This section will proceed to examine the economic importance of the two proposed pipeline projects. In examining the economic section of the framework, it becomes evident that the key question in the economics of pipelines is the idea of netbacks. Taking a framework of cost-benefit analysis, the first economic gain to a jurisdiction from resource extraction is economic rents. Commonly referred to as “netbacks” which is a term to be used below, economic rents are equal to the amount once all associated costs have been subtracted from revenues. These costs include all operating costs such as production costs, transportation costs, and administrative costs from the oil revenues. Royalties and taxes paid to governments reduce the return to the private producers but these payments are part of the social return that derived by society. The discussion that follows examines the projected economic benefits of the two pipeline projects. In considering the economic importance of the projects and the substitutability with other modes of transportation, the netbacks must be examined.¹⁴

A second economic gain to the economy from resource development is the “indirect net benefits” associated with distortions in markets. In this case, market prices may not reflect social values when prices are not equal to the opportunity cost of using a resource. For example, oil extraction requires capital and labour as inputs that can be drawn from other industries or from new supply provided by households. If there is a difference between the price paid by other industries for

¹⁴ *Catching the Brass Ring: Oil Market Diversification Potential for Canada*, page 42

resources and the opportunity cost for a household to give up leisure or saving, then it will matter where the resources are drawn. The differences in the demand and supply prices can be caused by taxes, regulations and unemployed resources. It should be noted that the studies cited regarding the economic benefits of the projects often assume the opportunity costs of labour and other inputs used in production are drawn from resources that are not employed elsewhere in the economy, especially labour. Instead, it is assumed more resource production increases demands for factors simply filter through the economy with new demand created for resources elsewhere that do not have an opportunity cost by being drawn from other sectors.

Economic net benefits, on the other hand, take into account all of the economic impacts of a project, including opportunity costs. The opportunity cost is the true cost of a project, taking into account the foregone costs of pursuing alternative options. Economic net benefit considers the costs of alternative methods of transportation, such as rail, truck or barge, the costs of exporting oil to alternative markets, and the cost of leaving the oil in the ground versus drilling and producing it. In failing to consider the opportunity costs, the studies have a tendency to exaggerate the economic benefits of the pipelines. However, both projects are important in that they will generate netbacks or economic rents, and both pipelines can be substituted (or supplemented) by alternative means of transportation only if it makes sense to do so in terms of netbacks accruing to producers.

A) Current economic situation in the oil and gas sector in Canada and the US

The oil and gas industry is of crucial importance for both the Canadian and Albertan economies.¹⁵ It is estimated that over the course of the next 25 years the oil and gas industry will contribute \$3.6 trillion to Canada's GDP, more than \$1.1 trillion in net revenues to the provincial and federal governments, and provide jobs for millions of Canadians. Canada's petroleum industry accounts for 8% of national GDP and is also Canada's largest private sector.¹⁶ Additionally, Alberta's oil sands sector, which makes up 98% of Canadian oil reserves,¹⁷ contributes \$1.5 trillion in net wealth for all Canadians.¹⁸

As was previously mentioned, by virtue of its location on the Western Canadian Sedimentary Basin (WCSB), Alberta is incredibly rich in energy resources such as oil. As of 2012, Canada is the sixth largest producer of oil in the world, and the eleventh biggest exporter of oil.¹⁹ Alberta accounts for approximately 62.8% of Canada's energy output and production,²⁰ and 98% of Canada's oil reserves.²¹ Alberta's oil sands contain 170 billion barrels of economically viable crude

¹⁵ *Public Interest Benefit Evaluation of the Enbridge Northern Gateway Pipeline Project: Update and Reply Evidence*, page 8

¹⁶ *Public Interest Benefit Evaluation of the Enbridge Northern Gateway Pipeline Project: Update and Reply Evidence*, page 20

¹⁷ US Energy Information Administration. December 10, 2012. *Background – Canada is one of the world's five largest energy producers and is the principal source of U.S. energy imports*. (Accessed July 30, 2013)

¹⁸ *Public Interest Benefit Evaluation of the Enbridge Northern Gateway Pipeline Project: Update and Reply Evidence*, page 8

¹⁹ *Background – Canada is one of the world's five largest energy producers and is the principal source of U.S. energy imports*.

²⁰ Natural Resources Canada. *Energy*. August 28, 2011. <http://www.nrcan.gc.ca/statistics-facts/energy/895> (Accessed April 15, 2013).

²¹ Alberta Energy. *Facts and Statistics*. <http://www.energy.alberta.ca/OilSands/791.asp>. (Accessed July 30, 2013)

bitumen,²² and this is second only to Saudi Arabia in proven oil reserves. These statistics are staggering, and serve to illustrate just how important the sector is to Canada's continued economic growth and prosperity. In order to generate revenues, it is important to extract and export this oil. Pipelines have become vital in transporting this bituminous oil from origin to market.²³

Since Alberta is a land-locked province, located in between British Columbia and Saskatchewan, it relies on pipeline infrastructure to transport the oil located in the WCSB to its ultimate markets. Access to these distant, high-demand markets is essential, but limited by the transportation costs and available pipeline infrastructure.^{24, 25} Alberta's difficulty in exporting oil to high demand markets means that Alberta's oil is priced at a discount in comparison to global crude prices. This discount is a location discount, reflecting the higher costs associated with transporting the crude oil to market.²⁶ Lower prices for Alberta's oil exports decrease the revenues (which in turn affects netbacks), from the energy sector, and decrease the production of oil in the province. Access to distant, high-demand markets is essential, but limited by available pipeline infrastructure.^{27, 28}

While Canada is a net exporter of oil, the US is a net importer, relying heavily on foreign oil imports to meet its demand for oil. In 2012, the US was the world's biggest consumer of petroleum products and crude oil, consuming approximately

²² "Energy Economics Understanding Royalties." page 5

²³ "Energy Economics Understanding Royalties." page 6

²⁴ "Ibid., page 4

²⁵ "Pacific Basin Heavy Oil Refining", page 3

²⁶ Grissom, Susan; Hackett, David; Moore, Michal; Leigh, Noda; Winter, Jennifer. (February 2013) "Pacific Basin Heavy Oil Refining," *SPP Research Papers*, 6(8), page 3

²⁷ Government of Alberta. "Energy Economics Understanding Royalties." 2010, 18. page 4

²⁸ "Pacific Basin Heavy Oil Refining," page 3

18.6 million barrels per day. In the same year the US produced 11.1 million barrels per day, and imported 7.4 million barrels per day to meet the demand for oil.²⁹ This means that the US relied on imports for 40% of the oil consumed in 2012,³⁰ and approximately 28% of these imports were from Canada.³¹

Despite the US' position as a net importer of oil, its reliance on foreign oil imports has been on the decline since 2005.³² This decrease in reliance on imports can be attributed to a combination of factors. Firstly, since the 2008 financial crisis, US consumption of oil has fallen. Although consumption hit an all-time low in 2009, and has since been increasing, consumption has yet to return to pre-2005 levels.³³

Secondly, there has been an increase in the domestic production of crude oil in the US. This is largely a result of improved drilling techniques, which have allowed producers to drill in previously inaccessible areas, such as the Bakken play in North Dakota.³⁴ The Bakken play is now one of the largest crude oil producing areas in the United States, and its continued development allows the US to be more self-sufficient in terms of oil. In 2004, the gross oil production in the Bakken play was 8.4 million barrels (mmbbl), and in 2011 this number increased to

²⁹ U.S. Energy Information Administration. *Overview data for United States*. May 30, 2013. <http://www.eia.gov/countries/country-data.cfm?fips=US> (Accessed July 30, 2013)

³⁰ U.S. Energy Information Administration. *How dependent are we on foreign oil?* May 10, 2013. http://www.eia.gov/energy_in_brief/article/foreign_oil_dependence.cfm (Accessed July 30, 2013)

³¹ *How dependent are we on foreign oil?*

³² *How dependent are we on foreign oil?*

³³ U.S. Energy Information Administration. *This Week in Petroleum - U.S. Oil Import Dependence: declining no matter how you measure it*. May 25, 2011.

<http://www.eia.gov/oog/info/twip/twiparch/2011/110525/twipprint.html> (Accessed July 30, 2013)

³⁴ Government of British Columbia. *Requirements for British Columbia to Consider Support for Heavy Oil Pipelines*. Technical Analysis, British Columbia, 2012, page 51

138.6mmbbl.³⁵ This development has the capacity to displace a large portion of Canadian crude imports.

Canada's petroleum industry is bound to and relies upon the US demand for oil. Approximately 99% of all oil sand exports are going to the United States, the vast majority of it going to the refineries located in the Midwest.³⁶ Relying on one major foreign market for its petroleum exports is a precarious position for Canada to be in. The combination of decreased demand for oil and increased production in the Bakken plays means that the US demand for Canadian oil imports is projected to continue to decline.³⁷ Additionally, the lack of pipeline capacity allowing Canadian producers to access coastal demand hubs where the demand for oil is higher, results in the continued sale of Canadian crude at discounted prices.³⁸ The lack of pipeline capacity and access to high-demand areas has had a "severe impact on the netbacks realized by Canadian producers."³⁹ These factors combined make it clear that it is important for Canadian to diversify its export market for crude oil. The construction of both the Northern Gateway and Keystone XL pipelines will facilitate the broadening of Canada's export market.

B) Economic importance of the pipeline projects

The construction of the Northern Gateway pipeline is expected to generate \$166 million in tax revenues for British Columbia, \$114 million in tax revenues in

³⁵ "Increasing rail transportation of crude oil narrows gap between prices of Bakken crude and west Texas intermediate." December 2012. *Oil and Gas Industry Report*, page 2

³⁶ The Climate Implications of the Proposed Keystone XL Oilsands Pipeline, page 6

³⁷ "Pacific Basin Heavy Oil Refining," page 1

³⁸ "Pacific Basin Heavy Oil Refining," page 17

³⁹ Canadian Energy Research Institute. July 2012. "Pacific Access Part I: Linking Oil Sands Supply to New and Existing Markets." Study No. 129 – Part I, page 1

Alberta, and \$913 million of tax revenue throughout Canada.⁴⁰ Enbridge estimates that Canada's gross domestic product (GDP) will increase by \$270 billion dollars over the next thirty years as a direct result of the pipeline. Federal, provincial and territorial governments combined are projected to receive \$81 billion in revenues. Alternatively, estimates by the Wright Mansell Research Group Ltd. suggest that the gain in GDP over the course of the pipeline's construction and operation (until 2058) would be even greater – approximately \$312 billion dollars.⁴¹ Again, these studies assume that the economic gains from the pipeline simply filter through the economy, and do not consider the economic net benefits, which consider opportunity costs of using labour and capital drawn from other sectors. This means that these statistics could be exaggerated although net benefits would be obtained at least in accordance to the economic rents earned from resource extraction.

In addition to this, tax revenues during the pipeline's operation are predicted to bring in \$1.2 billion to British Columbia, \$462 million to Alberta, and \$2.6 billion throughout the rest of Canada.⁴² Tax revenues are beneficial for the economy as they can be reinvested into public projects to further benefit the economy.⁴³ An analysis by the Wright Mansell Research Ltd. indicates that the benefits of the construction of the Northern Gateway pipeline would outweigh the potential costs, and that “there

⁴⁰ Enbridge. *Enbridge Northern Gateway Pipelines*. 2013. <http://www.northerngateway.ca/economic-opportunity/benefits-for-canadians/> (Accessed March 1, 2013).

⁴¹ *Public Interest Benefit Evaluation of the Enbridge Northern Gateway Pipeline Project: Update and Reply Evidence*, page 11

⁴² *Enbridge Northern Gateway Pipelines*.

⁴³ *Enbridge Northern Gateway Pipelines*.

is a large and robust net social benefit associated with the project from a national Canadian perspective.”⁴⁴

The Northern Gateway pipeline will grant access to the growing Asian-Pacific market and allow Alberta to diversify its export market. Accessing Asian markets is beneficial in that it has the potential to “contribute to a higher and more stable value for Canadian resources and their contributions to long term prosperity.”⁴⁵ The growth in oil demand in Asia can be attributed in large part to China’s increasing energy demands. China is currently the second biggest consumer of oil in the world, second only to the US. According to projections, China will be the world’s biggest net importer of oil by October 2013.⁴⁶ In accessing the Asian market, Canada gains from selling more crude oil, and also by receiving higher prices for the oil sold. The Northern Gateway pipeline would, therefore, provide a tidewater link to this emerging and fast-growing Asian market.⁴⁷ A higher price for oil would also increase TransCanada’s revenues, and this in turn increases netbacks.

A study conducted by Wood Mackenzie Smith found that, by the year 2020, the Northern Gateway pipeline generate between \$65.6 to \$67.7 per barrel in netbacks to producers, in allowing oil to be exported to China. The range in netbacks reflects the type of oil exported (Synbit or Dilbit). The same study found that by the year 2020, the US Petroleum Administration for Defense District IV (PADD IV)

⁴⁴ *Public Interest Benefit Evaluation of the Enbridge Northern Gateway Pipeline Project: Update and Reply Evidence*, page 16

⁴⁵ *Public Interest Benefit Evaluation of the Enbridge Northern Gateway Pipeline Project: Update and Reply Evidence*, page 8

⁴⁶ U.S. Energy Information Administration. *China poised to become the world's largest net oil importer later this year*. August 9, 2013. <http://www.eia.gov/todayinenergy/detail.cfm?id=12471&src=Analysis-b3> (Accessed August 15, 2013)

⁴⁷ Wood Mackenzie. December 2011. *A netback impact analysis of West Coast export capacity*. page 1

region in the United States would be the most attractive export option, generating between \$68.6 to \$70.3 per barrel in netbacks.⁴⁸ While exports to the PADD IV region offer the best netbacks, without the Chinese market as an export option, producers would lose US\$8 per every barrel in netbacks, equating to a loss of US\$6-7 billion per year.⁴⁹

The study found that the Northern Gateway pipeline is essential for market diversification, and that market diversification is key to generating greater netbacks:

“The Canadian supply profile suggests producers are likely to require additional market access to export incremental volumes of heavy crude oil to key demand centres. Given a current lack of access to key demand centres and the lengthy lead time required to execute a pipeline project and the projected growth in supply, the timing of a West Coast export capacity option is critical.”⁵⁰

The Keystone XL pipeline project is economically significant in that it would open up new markets in PADD III, located in the US Gulf Coast, where the majority of the refining capacity in North America is located.⁵¹ Refineries must first process crude oil before it can be put to use, and the majority of these refineries are located in the Gulf Coast and the Midwest US.⁵² In recent years, there has been a bottleneck of crude oil in Cushing, Oklahoma, due to insufficient pipeline infrastructure to

⁴⁸ Wood Mackenzie. December 2011. *A netback impact analysis of West Coast export capacity*. page 17

⁴⁹ *A netback impact analysis of West Coast export capacity*, page 20

⁵⁰ *A netback impact analysis of West Coast export capacity*, page 24

⁵¹ Droitsch, Danielle. *The link between Keystone XL and Canadian oilsands production*. Pembina Institute, page 2

⁵² *Catching the Brass Ring: Oil Market Diversification Potential for Canada*, page 2

transport the oil, resulting in an “overwhelmed logistics system.”⁵³This has made it difficult for oil to reach refineries in the Gulf Coast, and contributes to the price discount facing Canadian crude oil.⁵⁴

The Keystone XL pipeline will aid in relieving some of the congestion in Cushing, in addition to granting TransCanada access to the coast. This access will not only open a new market, but will also grant access to the sought-after coastal price for crude oil. This is certainly beneficial for TransCanada, and the Canadian economy, because a higher price for oil, coupled with access to the PADD III market means more revenues for producers, and higher netbacks.

In addition to higher revenues and greater netbacks, one estimate finds that, the construction of the Keystone XL pipeline will result in thousands of jobs in the US,⁵⁵ and bring vital transportation infrastructure to the North American oil producers that need to ship oil to the refineries in the PADD III region, and bring an economic “boost”⁵⁶ to the US. The pipeline will also create energy security for the US, allowing the US to substitute Canadian oil for other less reliable foreign sources (such as Venezuela and Mexico, the two biggest exporters to the US Gulf Coast).⁵⁷

C) Substitutability

Horizontal drilling, hydraulic fracturing, and other advanced drilling techniques, have made it economically feasible to drill for unconventional oil found

⁵³ *Catching the Brass Ring: Oil Market Diversification Potential for Canada*, page 2

⁵⁴ *Ibid.*, page 2

⁵⁵ *Catching the Brass Ring: Oil Market Diversification Potential for Canada*, page 15

⁵⁶ *Keystone XL Pipeline Project*.

⁵⁷ December 1, 2011. “Keystone XL Pipeline Overview: Overview and Issues for Debate.” *Congressional Digest*, page 290

in Alberta's oil sands and in the Bakken plays of North Dakota.⁵⁸ As a result of this rapid development, existing pipeline infrastructure has not been able to keep up with the increase production of crude oil from unconventional sources.⁵⁹ Currently, there is insufficient pipeline infrastructure to transport the oil originating in Alberta and the Bakken plays, to coastal refineries located in PADDIII, and final markets. This has resulted in a situation where the inland price of oil has been selling at a discount in comparison to the coastal prices. Bakken crude oil is trading at a discount in comparison to West Texas Intermediate (WTI) prices,⁶⁰ which is considered to be a benchmark price for oil in North America. To counteract this trend, producers have started to look at alternatives to pipeline transportation.

The shortage of pipeline infrastructure in North America has resulted in a situation where the market has become disconnected, resulting in distinct "supply basins"⁶¹ across the continent. As a result of this disconnect, the price of oil in coastal areas has strayed from the price of oil in landlocked jurisdictions, and there is now a distinct difference between the landlocked and coastal prices of oil.⁶² The price differential is a symptom of the insufficient pipeline infrastructure, whereby there is a relative surplus of oil in landlocked areas, and the demand for oil in coastal areas cannot be met by the existing pipeline infrastructure. This situation forces the coastal price above the landlocked price. This price differential decreases when the

⁵⁸ "Increasing rail transportation of crude oil narrows gap between prices of Bakken crude and west Texas intermediate," page 1

⁵⁹ Polczer, Shaun. *Tight oil fuels North American rail resurgence*. Petroleum Economist. 2013

⁶⁰ "Increasing rail transportation of crude oil narrows gap between prices of Bakken crude and West Texas Intermediate," page 2

⁶¹ *Tight oil fuels North American rail resurgence*

⁶² Frigon and Perreault. *The Economics of North American Pipeline Projects: The Race to the Sea*, page 2

demand for oil in coastal areas is met, either by the construction of pipeline infrastructure, or by using alternative means to transport crude oil.

As an example of this, in 2012 the production of crude oil in the Bakken area exceeded the transport capacity required to ship the crude oil to market. This resulted in a wedge between the price of Bakken crude oil and the price of WTI crude oil, and Bakken crude was traded at a lower price than WTI.⁶³ At its peak, the trading price between Bakken crude and WTI was at US\$20.6 per barrel. However, by September 2012, this differential had decreased to US\$6 per barrel, in large part due to the fact that companies had started shipping Bakken crude by rail versus pipeline.⁶⁴ In 2009, virtually all of the Bakken crude oil was shipped to refineries in the Gulf Coast via pipeline, but by September 2012, 56% of Bakken oil was shipped by rail.⁶⁵

An alternative to pipeline transportation is the pipeline by rail method of transportation. Transporting crude oil by rail has a number of advantages to pipeline transportation. Firstly, the initial capital costs incurred are lower than the capital costs incurred to build a pipeline. The reason for this is that the required infrastructure for railways is already largely in place, and if it is not, it is easier to add to existing railway networks than to build a pipeline network. Rail transport, therefore, does not pose as many logistical limitations as pipelines. Currently, there are 175,000 railway tracks across North America, and railway infrastructure is well

⁶³ "Increasing Rail Transportation of Crude Oil Narrows Gap Between Prices of Bakken Crude and West Texas Intermediate," page 1

⁶⁴ "Increasing Rail Transportation of Crude Oil Narrows Gap Between Prices of Bakken Crude and West Texas Intermediate," page 1

⁶⁵ "Increasing Rail Transportation of Crude Oil Narrows Gap Between Prices of Bakken Crude and West Texas Intermediate," page 3

developed. This means that railways can reach areas that pipelines simply cannot.⁶⁶

Secondly, the pipeline approval process can be burdensome and plagued by delays, as both the Northern Gateway and Keystone XL projects have illustrated. Transporting crude oil across provincial borders or the Canada-United States border by rail does not require approval or a presidential permit.⁶⁷ Provinces cannot legally prevent rail transport, and neither can the President. Railway transportation is therefore flexible, does not require a lengthy approval process, and can reach remote refineries with greater ease due to a well-developed railway network. Despite these benefits, however, how economically feasible is it to substitute rail for pipeline transportation?

By connecting these isolated, landlocked supply basins with coastal refineries using the pipeline by rail method, the differential between the coastal and landlocked oil prices will decrease. However, the netback, or profit per barrel of oil, from rail is higher when the wedge between the inland and coastal price of crude oil is higher as well. This means that once the price differential is equalized, the use of railways to transport crude oil will not be as economical. Ultimately, it is the price of oil and the spread between the inland and coastal prices that determines whether it is feasible to substitute rail transport for pipeline transportation. The bigger this wedge is between landlocked prices and coastal prices for crude oil, the more appealing is the case for rail transport. Depending on the price of oil, it may not be as feasible to substitute rail transport for pipeline transport. Despite the fact that rail is in fact a more costly option to transfer crude oil, it is becoming a more feasible

⁶⁶ *Tight oil fuels North American rail resurgence*

⁶⁷ *Tight oil fuels North American rail resurgence*

option as the price differential between the inland and coastal prices grows.

Transportation by rail does pose logistical drawbacks. Producers are unable to transport as much crude oil by rail as by train. This suggests that perhaps rail transportation should act as a supplement to pipelines, as opposed to substituting it entirely.⁶⁸ There are also a number of associated costs that must be taken into consideration when considering the cost of rail transport. Railcar loading and offloading can cost between \$1.50 to \$3 per barrel. Additionally, rail cars must be leased, at a cost that ranges from \$1.50 to \$2.50 per barrel.⁶⁹ In strictly economic terms, as long as there is a spread between the coastal and inland price of oil, pipeline by rail transportation is feasible. However, the smaller this wedge is, and the higher the cost of railway transportation, the smaller the netback for producers is.

Netbacks to producers are affected by transportation costs. Transportation costs must therefore be examined in determining the substitutability of pipelines to transporting oil via railways. It costs around \$7 to \$9 per barrel to transport Dilbit (diluted bitumen) to China via railway and then by tanker. Raw bitumen would be more expensive to transport in this way, costing between \$8 to \$11 per barrel.⁷⁰ Whether it is raw bitumen or Dilbit that is transported by rail, it is clear that it is both feasible and profitable in terms of netbacks, to substitute rail transport for pipeline transport in the Northern Gateway case, as rail transport is two to three

⁶⁸ Fekete, Jason. *Pipeline protests spur companies to consider shipping oilsands crude by rail*. Postmedia News. August 10, 2013.

⁶⁹ Alberta Oil Staff. *Shipping crude oil by rail gathers steam in Western Canada*. <http://www.albertaoilmagazine.com/2013/03/shipping-crude-oil-by-rail/> (Accessed July 30, 2013)

⁷⁰ *Catching the Brass Ring: Oil Market Diversification Potential for Canada*, page 5

dollars per barrel more expensive than pipeline transportation. While rail transportation would reduce netbacks for producers, this reduction would not be detrimental to TransCanada's bottom line.

In its Draft SEIS the US State Department analyzed the economic feasibility of transporting oil by rail versus the proposed Keystone XL pipeline. While rail transport is more expensive, the draft SEIS found that rail transport could be a possible alternative to the pipeline. It costs approximately \$7 per barrel to transport oil by pipeline, and the SEIS found that the cost of shipping Alberta's oilsands to the United States Gulf Coast would cost around \$15 per barrel.⁷¹ While rail transportation to the United States Gulf Coast is more expensive, it is feasible as long as the price of oil remains at a level that results in netbacks for producers.

In terms of netbacks accruing to producers, it is possible to substitute pipeline transportation with railway transportation. Despite this fact, politically speaking the pipeline by rail alternative may not be popular. Railway accidents can happen and can have detrimental consequences, as is evidenced by the recent accident at Lac Megantic. Railway accidents are also approximately three times more frequent than pipeline accidents,⁷² although the volume of the spills is usually smaller because rail cars have a smaller carrying capacity than pipelines.

D) Tariffs and taxation

One of Premier Clark's conditions is that British Columbia should receive a

⁷¹ Lemphers, Nathan. May 23, 2013. "The climate implications of the proposed Keystone XL oilsands pipeline." *Pembina Institute Research Paper*.

⁷² Penty, Rebecca; Efstathiou, James. April 9, 2013. *Killing Keystone pipeline seen as risking more oil spills by rail*. http://business.financialpost.com/2013/04/09/killing-keystone-pipeline-seen-as-risking-more-oil-spills-by-rail/?_lsa=1292-068e (Accessed July 30, 2013)

share of Alberta's royalty revenues. British Columbia is not entitled to receive any royalties, and cannot legally impose any royalties on Alberta oil shipped to British Columbia via pipeline. Alberta also has no legal obligation to share the royalties with British Columbia.⁷³ British Columbia has a Corporate Income Tax Collection Agreement in place with the federal government, which results in the BC corporate tax base being harmonized with the federal base with federal government paying for administrative costs.

British Columbia does have its own levies that can be imposed such as the property tax of which various classes are rated including pipelines. It is also possible for British Columbia to assign different tax rates on oil and natural gas pipelines, imposing a higher tax rate for the oil pipelines. This would affect Alberta producers, given that British Columbia is Canada's second largest producer of natural gas, and has a greater number of natural gas pipelines than oil pipelines in the province.⁷⁴ In other words, it is possible for British Columbia to target the Northern Gateway pipeline (and Kinder Morgan's Trans Mountain pipeline) by levying property taxes on oil pipelines, and leave British Columbia's natural gas pipelines unaffected by the taxes. This would increase British Columbia's provincial tax revenue from oil pipelines.

It is also feasible for British Columbia to impose a non-harmonized levy, such as an environmental levy, to go towards a pipeline spillage fund. This levy would act

⁷³ Centre for Constitutional Studies. 2012. *B.C. Premier Vows to Shut Down Northern Gateway Pipeline Project if 5 "Bottom-Lines" Aren't Met: Can She, Constitutionally?*

http://www.law.ualberta.ca/centres/ccs/issues/Gateway_Pipeline.php (Accessed July 30, 2013)

⁷⁴ Centre for Energy. 2013. *Energy Facts & Statistics: British Columbia.*

<http://www.centreforenergy.com/FactsStats/MapsCanada/BC-EnergyMap.asp> (Accessed September 10, 2013)

to mitigate some of the environmental risks inherent in transporting oil by pipeline, reflecting the greater environmental risk that British Columbia must bear. However, it does not satisfy British Columbia's desire for a fair share of the royalty revenues, which is the focus of the interprovincial dispute.

Pipelines crossing the United States-Canada border cannot be taxed, and this is because of the North American Free Trade Agreement (NAFTA). Even if the United States desired to put tariffs or taxes in place on pipelines carrying Canadian crude oil, it could not due to the free trade agreement in place. Article 903 of NAFTA states that:

“Neither Party shall maintain or introduce any tax, duty or charge on the export of any good to the other Party, unless such tax, duty, or charge is also maintained or introduced on such energy good when destined for domestic consumption.”

Interestingly enough, the Keystone XL pipeline dispute is not characterized by a dispute over compensation. Unlike British Columbia, the individual states that the pipeline traverses, and the United States as a whole, have not asked for a share of Alberta's royalty revenues. The Keystone XL pipeline dispute is more political in nature. President Obama has been hesitant to approve the project in an effort to push his second term climate change policy and gain favour with his environmentalist supporters. The Northern Gateway and Keystone XL disputes are inherently different in nature.

V. Legal issues

The legal issues concerning the approval of the two pipeline projects are examined because they reflect a problem of coordination of laws and regulations when a pipeline spans multiple jurisdictions. The section will examine the pipeline approval process and who has the ultimate jurisdiction to approve a pipeline

project. In Canada, British Columbia is attempting to block the construction of the Northern Gateway pipeline, but does it have the power to do so? British Columbia has also been seeking additional pipeline royalty revenue reimbursement. Does it have the power to do so? This section also illustrates how the different laws in the jurisdictions involved can cause delays in getting the pipeline projects approved.

A) Pipeline jurisdiction and approval process in Canada

Pipeline projects located entirely within the borders of one province are subject to the laws and regulations of that province. When a pipeline system crosses multiple jurisdictions, whether it be it interprovincial or international jurisdictions, the pipeline system falls under the federal government's jurisdiction, and this division of powers is constitutionally entrenched. Section 92(10)(a) of the *Constitution Act, 1982* states that:

“92. In each province the Legislature may exclusively make Laws in relation to Matters coming within Classes of Subjects next hereinafter enumerated; that is to say

10. Local works and Undertakings other than such as are of the following Classes:

a) Lines of Steam or other Ships, Railways, Canals, Telegraphs, and other Works and Undertakings connecting the Province with any other or others of the Provinces, or extending beyond the Limits of the Province”⁷⁵

This means that individual provinces do not have the ability to block a proposed pipeline project, such as the Northern Gateway Pipeline. Despite the fact

⁷⁵ *Constitution Act, 1982*

that Christy Clark, the Premier of British Columbia, has promised to block the Northern Gateway Pipeline's construction if five fundamental points are not met, the British Columbia provincial government does not have the ability or the jurisdiction to do so. Ultimately, the approval of any international or interprovincial pipelines lies with the federal government's jurisdiction. However, the provinces do have the power to influence regulation as it pertains to pipelines crossing their boundaries.⁷⁶

Regulation of the construction and continued operation of interprovincial and international pipelines is directly regulated by the National Energy Board (NEB), a federal agency, and indirectly by provincial agencies. The NEB is responsible for overseeing the approval process of proposed international or interprovincial pipelines pipeline projects, as per the *National Energy Board Act*.⁷⁷ Canada has more than 100,000 kilometres of pipelines, 70% of which are regulated by the NEB,⁷⁸ while the remaining 30% are provincial jurisdiction.⁷⁹

The NEB was established in 1959 under the *National Energy Board Act*. The NEB reports to the Minister of Natural Resources, and in this way is responsible to Parliament.⁸⁰ The NEB regulates six different aspects of the energy industry:

- 1) The construction and operation of both international and interprovincial pipelines
- 2) The regulation of pipeline tariffs or tolls

⁷⁶ Becklumb, Penny. *Provincial Jurisdiction over Interprovincial Pipelines*. Ottawa: Parliament Research Publications, 2013.

⁷⁷ Becklumb, Penny. *Pipelines: Government Decision-Making*. Research Publication, Ottawa: Parliament Research Publications, 2012.

⁷⁸ *Provincial Jurisdiction over Interprovincial Pipelines*

⁷⁹ *Provincial Jurisdiction over Interprovincial Pipelines*

⁸⁰ National Energy Board. *National Energy Board*. July 2, 2013. (Accessed July 4, 2013). Natural Resources Canada. *Energy*. August 28, 2011. <http://www.nrcan.gc.ca/statistics-facts/energy/895> (accessed April 15, 2013).

- 3) The construction and operation of both international and interprovincial power lines
- 4) The trade of natural gas (imports and exports)
- 5) The trade in electricity and oil (imports and exports)
- 6) The “frontier oil and gas activities”⁸¹ which refers to any offshore areas that are not under provincial or federal jurisdiction

The international or interprovincial pipeline approval process in Canada is twofold. Firstly, the construction and operation of the pipeline project requires federal government approval. A regulatory application must be filed with the NEB for potential interprovincial or international pipeline projects. In reviewing the regulatory application, the NEB considers whether the pipeline project would be beneficial in terms of economic, environmental and social factors,⁸² and whether or not the pipeline project is in the public interest.⁸³ In determining whether a project is in the public interest, the NEB considers whether or not the pipeline will “contribute to sustainability of the Canadian economy general and of the energy sector specifically.”⁸⁴

Secondly, the proposed inter-jurisdictional pipeline requires an environmental assessment under the *Canadian Environmental Assessment Act, 2012*.⁸⁵ The NEB and the Canadian Environmental Assessment Agency (CEAA) conduct this environmental review in a joint review panel (JRP). The JRP is tasked

⁸¹ *National Energy Board*

⁸² *Pipelines: Government Decision-Making.*

⁸³ *Pipelines: Government Decision-Making.*

⁸⁴ *Public Interest Benefit Evaluation of the Enbridge Northern Gateway Pipeline Project: Update and Reply Evidence.* page 7

⁸⁵ *Pipelines: Government Decision Making*

with determining whether a proposed project is in the national interest, and whether it negatively impacts the environment.⁸⁶ In doing so, the JRP examines safety, engineering, economic issues, and environmental issues that the pipeline may pose.

Upon completion of the public hearings and the review process, the JRP issues a report of its findings to the federal government. In addition to the report, the JRP also issues its “Reason for Decision”⁸⁷ as per the *National Energy Board Act*. If, upon completion of the JRP hearing process, the NEB determines that the proposed pipeline is in fact in the public interest, it issues a certificate allowing the construction of an international or interprovincial pipeline.⁸⁸

However, it is possible that provincial regulations are laws can indirectly affect the construction and operation of a pipeline project. Perhaps the most obvious example deals with taxation, whereby a province may pass a tax law applying to pipelines located within that province.⁸⁹ A province could also pass laws pertaining to the environmental assessment process. All provinces have environmental assessment legislation safeguarding environmentally sensitive Crown lands, forests and wildlife, which provinces do have jurisdiction over.⁹⁰ If a provincial and federal environmental assessment is conducted and the two assessments do not come to the same conclusion, the federal assessment takes precedence over the provincial

⁸⁶ National Energy Board. *Northern Gateway Pipeline Project - Joint Review Panel Agreement and Terms of Reference*. December 4, 2009. <http://www.neb-one.gc.ca/clf-nsi/archives/rthnb/nws/nwsrls/2009/nrthrngtwjrpgrmntbckgrndr-eng.html> (Accessed on August 1, 2013).

⁸⁷ Canada News Centre. *Northern Gateway Pipeline Project Joint Review Panel Agreement Issued*. <http://news.gc.ca/web/article-eng.do?m=/index&nid=500329> (Accessed on July 20, 2013)

⁸⁸ *Pipelines: Government Decision-Making*

⁸⁹ *Provincial Jurisdiction over Interprovincial Pipelines*

⁹⁰ *Provincial Jurisdiction over Interprovincial Pipelines*

one. If the two assessments do reach the same conclusions, the province could use the environmental assessment as leverage to influence the construction and operation of the pipeline project by attaching “stricter terms and conditions to its consent [assessment]”⁹¹ than to the federal government’s consent.

To summarize, provincial consent is not required for the construction of an interprovincial or international pipeline. The *Constitution Act, 1867* firmly entrenches the division of powers between the federal and provincial governments, and pipelines fall under federal jurisdiction.

Enbridge filed a regulatory application for a certificate of public convenience with the JRP in 2010, and this application is currently under review. The JRP’s public hearings concluded on June 6, 2013, and the JRP now has until December 2013 to complete the environmental assessment and to prepare a recommendation report. Following the completion of the environmental assessment and recommendation report, the decision regarding the approval of the project will be brought to Cabinet in early 2014. It should be noted that while British Columbia is participated in the JRP hearings as an intervener, provincial consent is not required for the proposed Northern Gateway pipeline to be approved.⁹² Ultimately, jurisdiction over interprovincial and international pipelines in Canada rests with the federal government. Provinces can in no way directly block the construction of a cross-border work.

⁹¹ *Provincial Jurisdiction over Interprovincial Pipelines*

⁹² Centre for Constitutional Studies. *B.C. Premier Vows to Shut Down Northern Gateway Pipeline Project if 5 “Bottom-Lines” Aren’t Met: Can She, Constitutionally?*
http://www.law.ualberta.ca/centres/ccs/issues/Gateway_Pipeline.php#_edn11 (Accessed on July 30, 2013)

B) Pipeline jurisdiction and approval process in the United States

The proposed Keystone XL route is both an international and inter-state pipeline. The route originates in Hardisty, Alberta, spanning across Montana and South Dakota before reaching its final destination at Steele City, Nebraska. This means that there is an interesting legal jurisdiction in play, given that international pipelines are federal jurisdiction, but inter-state pipelines fall under state jurisdiction.

The President of the United States has the authority over items that affect foreign affairs,⁹³ as established under Article II of the Constitution.⁹⁴ Congress, on the other hand has historically had the authority over foreign commerce,⁹⁵ as granted by the Constitution in Article I, Section 8.⁹⁶ Cross-border pipelines fall under both the foreign affairs and foreign commerce category, and therefore the question as to whether the President or Congress has authority to approve an international pipeline project arises. In the past, the President has traditionally granted or denied approval for cross-border pipelines “in the absence of either a congressional grant or denial of authority.”⁹⁷ Given that Congress does have jurisdiction over foreign commerce, Congress could theoretically assert its authority over cross-border pipelines. It can therefore be argued that cross-border pipeline projects can potentially fall under executive (presidential) or legislative (Congressional) jurisdiction.

⁹³ Ibid, page 6

⁹⁴ Vann, A, et al. “Proposed Keystone XL Pipeline, Legal Issues.” *CRS Report For Congress*, page 12

⁹⁵ “Proposed Keystone XL Pipeline, Legal Issues.” page 12

⁹⁶ Ibid., page 6

⁹⁷ “Proposed Keystone XL Pipeline, Legal Issues.” page 12

Executive Orders 11423 and 13337 grant the federal branch of government the authority to approve international pipeline projects. In the United States, Executive Order 11423 grants the Secretary of State the authority to approve international pipeline projects, stating that the:

“Secretary of State is hereby designated and empowered to receive all applications for permits for the construction, connection, operation, or maintenance, at the borders of the United States, of: (i) pipelines, conveyor belts, and similar facilities for the exportation or importation of petroleum, petroleum products, coal, minerals, or other products to or from a foreign country.”⁹⁸

Executive Order 13337 outlines the process for the issuance of Presidential permits for energy-related facilities, such as pipelines, that cross international borders.⁹⁹ The Executive Order states that the Department of State is to review the applications for pipeline projects, which cross international boundaries.¹⁰⁰ In doing so, the State Department consults with key individuals from various federal agencies (the Secretary of Defense, the Attorney General, the Secretary of the Interior, the Secretary of Commerce, the Secretary of Transportation, the Secretary of Energy, the Secretary of Homeland Security, the Administrator of the Environmental Protection

⁹⁸ National Archives. *Federal Register – Executive Orders*. <http://www.archives.gov/federal-register/codification/executive-order/11423.html>. (Accessed July 30, 2013)

⁹⁹ Government Printing Office. *Executive Order 13337*. April 30, 2004. <http://www.gpo.gov/fdsys/pkg/WCPD-2004-05-10/pdf/WCPD-2004-05-10-Pg723.pdf> (Accessed July 30, 2013)

¹⁰⁰ *Executive Order 13337*

Agency) and the public,¹⁰¹ to determine whether the project is in the national interest. The State Department does not examine the same factors for all projects in determining national interest,¹⁰² and so the criteria for which national interest is may vary from project to project. Generally speaking, however, national interest is determined based on whether a project will be economically beneficial, based on environmental factors, and other social factors.¹⁰³

Under the National Environmental Policy Act (NEPA), the State Department must document all environmental impacts of a proposed pipeline project in an Environmental Impact Statement (EIS). The EIS is intended to be a part of the State Department's decision-making process, and it can in no way prohibit the construction of a pipeline project that may have negative environmental impacts because its findings can be overturned and is subject to judicial review.¹⁰⁴

After this review process, the State Department may either accept or reject a pipeline project, depending on whether or not the project is deemed to serve the national interest.¹⁰⁵ National interest is not strictly defined under the Executive Orders, but may include "energy security, health, environmental, cultural, economic, and foreign policy concerns."¹⁰⁶ The President does have the power to overturn a

¹⁰¹ Tweed, Caitlin. *Keystone XL: National Security Arguments Hide Real Debate*. December 26, 2011. <http://nationalsecuritylawbrief.com/2011/12/26/keystone-xl-national-security-arguments-hide-real-debate/> (Accessed July 30, 2013)

¹⁰² Hudson, Jehmal. "Keystone XL Pipeline: Will it be Approved?" *American Bar Association*. Vol. 52 No. 2

¹⁰³ "Keystone XL Pipeline: Will it be Approved?"

¹⁰⁴ *Keystone XL: National Security Arguments Hide Real Debate*

¹⁰⁵ *Executive Order 13337*

¹⁰⁶ U.S. State Department. *New Keystone XL Pipeline Application*. May 23, 2013. <http://www.keystonepipeline-xl.state.gov> (accessed June 10, 2013).

decision made by the Secretary of State,¹⁰⁷ and in this way, the ultimate power of approval of international pipelines rests with the President.

The Keystone XL project is interesting in that it has international and interstate segments, which means that the federal government has the authority to approve the project, but individual states have the siting authority over the route. The revised route proposed by TransCanada has the Keystone XL passing through Montana, South Dakota and Nebraska. Both Montana and South Dakota have pipeline siting legislation in place. In light of the controversy arising from the Keystone XL pipeline's proposed route in that TransCanada's original proposed route would pass through the Ogallala Aquifer and the Sand Hills regions, two environmentally sensitive areas, the State of Nebraska passed pipeline siting legislation on November 22, 2011. This legislation granted the state of Nebraska a role in deciding the route of pipelines that pass through the state,¹⁰⁸ and directing collaboration with the State Department on environmental impact statements for proposed pipeline projects.

In 2008, TransCanada submitted an application to both the NEB and the U.S. State Department regarding the construction of the Keystone XL segment. The NEB approved the project in 2010, and thus the Canadian segment of the system was fairly uncontroversial in terms of the approval process.

However, the United States sections of the Keystone XL pipeline have been controversial, and yet to be approved. In November 2011, the State Department

¹⁰⁷ *Keystone XL: National Security Arguments Hide Real Debate*

¹⁰⁸ Neb. Laws LB1. November 22, 2011,

http://nebraskalegislature.gov/FloorDocs/Current/PDF/Final/LB1_S1.pdf (Accessed July 30, 2013)

ruled that additional information was needed regarding the environmental impact of the Keystone XL pipeline, and that alternative routes circumventing the Sand Hills region ought to be considered. However, with the passing of Temporary Payroll Tax Cut Continuation Act in December 2011, President Barak Obama had only 60 days to either issue or reject the Presidential Permit for the pipeline. On January 18, 2011, the State Department issued a recommendation to President Obama to reject the issuance of a presidential permit for the Keystone XL pipeline.¹⁰⁹ The State Department's recommendation was based on the fact that the 60-day deadline did not allow for enough time to "prepare a thorough, rigorous, and transparent review of an alternative route through Nebraska"¹¹⁰ and to examine whether the pipeline would be in the "national interest."¹¹¹ In response to this rejection, TransCanada submitted yet another application to the State Department for this project on May 4, 2012.¹¹² The State Department then released a Draft Supplementary Environmental Impact Statement (SEIS) on March 1, 2013, which found that "there would be no significant impacts to most resources along the proposed Project route."¹¹³ Yet despite this finding, President Obama has not approved the Keystone XL pipeline project yet.

¹⁰⁹ U.S. Department of State. *Denial of the Keystone XL Pipeline Application*. January 18, 2012. <http://www.state.gov/r/pa/prs/ps/2012/01/181473.htm> (accessed June 10, 2013).

¹¹⁰ United States Department of State Bureau of Oceans and International Environmental and Scientific Affairs. *Draft Supplemental Environmental Impact Statement for the Keystone XL Project Applicant for Presidential Permit: TransCanada Keystone Pipeline, LP*. Supplemental Environmental Impact Statement, United States Department of State, 2013, page 3

¹¹¹ *Pipelines: Government Decision-Making*

¹¹² *Pipelines: Government Decision-Making*

¹¹³ TransCanada. *Keystone XL Pipeline Project*. 2013. <http://keystone-xl.com/#sthash.HdayABrY.dpuf> (accessed July 1, 2013).

VI. Political issues

Lastly, the political issues are examined, illustrating how the parties involved in the pipeline projects have different priorities, resulting in the pipeline disputes. In Canada, the Northern Gateway pipeline dispute is between the provinces of Alberta and British Columbia. The respective provincial government opinions will be examined, to gain insight into the nature of the dispute. It will become evident that the dispute is rooted in disagreements over compensation. The United States federal government's opinion will be discussed, and it will become clear that the Keystone XL dispute is of a political nature. President Obama has been hesitant to approve the project in an effort to appease his environmental supporters. This mismatch of priorities or political goals results in the pipeline disputes.

A) Northern Gateway: Federal government opinion and prerequisites for approval

The Northern Gateway pipeline project has encountered opposition from the government of British Columbia. The Government of British Columbia claims that the Province will bear the majority of the environmental risk in transporting oil extracted in Alberta via pipeline to the marine terminals in Kitimat. Those opposed to the project argue that British Columbia will not receive the economic benefits (in terms of royalty revenues, for example) reflecting the risk that it must bear.¹¹⁴

A 2012 technical analysis report conducted by the Government of British Columbia sums up the provincial government's views on the project:

¹¹⁴ Government of British Columbia. 2012. *Requirements for British Columbia to Consider Support for Heavy Oil Pipelines*, page 44

“...we recognize that there are some projects for which the environmental and social risks outweigh the economic benefits. We do not yet have enough information to determine whether or not this statement applies to the Northern Gateway Project.”¹¹⁵

Furthermore, the report outlined five key points that must be addressed prior to the approval and construction of the project. The five key points are as follows:

- 1) The successful completion of the environmental review process by the JRP and the approval of the project by the NEB
- 2) In order to mitigate the environmental risks to British Columbia’s coastline, marine oil spill response and prevention systems must be established
- 3) In order to mitigate the environmental risks to British Columbia’s environmentally sensitive areas, oil spill response and prevention systems must be established for heavy oil pipelines
- 4) Aboriginal rights must be addressed with respect to treaty rights
- 5) British Columbia must receive its “fair share” of economic benefits. These benefits must reflect the risk that British Columbia would have to face as a result of this pipeline.¹¹⁶

The 2012 technical analysis report conducted by the Government of British Columbia found that of the projected \$81 billion in government revenue, only \$6.7 billion will accrue to British Columbia, which amounts to 8.2 percent. The provincial government argues that 8.2 percent of the profits is not enough given that British

¹¹⁵ *Requirements for British Columbia to Consider Support for Heavy Oil Pipelines*, page 2

¹¹⁶ *Requirements for British Columbia to Consider Support for Heavy Oil Pipelines*, page 3

Columbia is bearing close to 100 percent of the risk.¹¹⁷ \$36 billion, or approximately 44 percent, of the total government revenue will go to the federal government. This revenue is not considered to be dedicated revenue; rather it will be collected as general revenue. While it is expected that the \$36 billion accruing to the federal government will be redistributed on a per capita basis across the country, there is no guarantee that the general revenue will be distributed in this manner,¹¹⁸ and the government of British Columbia argues that this is not sufficient.

Because the oil transported by the Northern Gateway Pipeline originates in Alberta's oilsands, the royalty revenue from the oil extracted from the oil sands will go to Alberta. As was discussed previously, the price of oil in Alberta is currently at a discounted price due to the discrepancy between the waterborne and landlocked prices for oil. Access to Asian and other emerging markets where the demand for oil is greater will result in an increased price for oil, and allows for a greater volume of oil to be exported. This results in more royalty revenue for Alberta, and greater netbacks for producers. Again, government of British Columbia argues that this is not fair since British Columbia is bearing the majority of the risk in transporting the bitumen mined in Alberta.¹¹⁹

On the other hand, Alison Redford, the Premier of Alberta, has stressed that while it is important for the economic benefits resulting from the construction of the pipeline to be distributed amongst the provinces, it would be unconstitutional for

¹¹⁷ Ibid., page 48

¹¹⁸ Ibid., page 49

¹¹⁹ *Requirements for British Columbia to Consider Support for Heavy Oil Pipelines*, page 50

British Columbia to ask for a bigger share of the royalty revenue because the federal government redistributes revenues to all the provinces through transfer payments:

"We have in our provinces the right to income from resources. We have Confederation, which allows for people in each province to benefit from the resources they have to retain jurisdiction over those resources, and then to be part of federal system that allows for transfer payments."¹²⁰

Despite the fact that the federal government has the ultimate jurisdiction over the pipeline approval process, Premier Harper's Conservative federal government has refrained attempting to influence the approval of the Northern Gateway pipeline project. When speaking about the Northern Gateway pipeline approval process, Harper has stated that:

"Decisions on these kinds of projects are made through an independent evaluation conducted by scientists into the economic costs and risks that are associated with the project. And that's how we conduct our business. The only way that governments can handle controversial projects of this manner is to ensure that things are evaluated on an independent basis scientifically and not simply on political criteria."¹²¹

Yet despite this statement, it appears as though the federal government's decision to keep out of the political discussions regarding the pipeline project is for political reasons. Polls have indicated that, for the most part, the Northern Gateway

¹²⁰ CBC News. *B.C., Alberta premiers clash over Gateway pipeline revenue Redford rules out Clark's demand for 'fair share' of royalties*. July 24, 2012. <http://www.cbc.ca/news/canada/british-columbia/story/2012/07/24/bc-alberta-gateway-pipeline.html> (accessed May 10, 2013).

¹²¹ CBC News. *Harper defends independence of pipeline approval process*. August 7, 2013. <http://www.cbc.ca/news/politics/story/2012/08/07/pol-gateway-tuesday-harper-bc.html>. (Accessed July 30, 2013)

pipeline project does not have popular support in British Columbia. For example, a 2012 poll conducted by Forum Research Inc. found that 52% of British Columbians are opposed to the proposed project, while 37% are in support of it.¹²² This lack of support “may exert an even greater influence over the final decision-making process.”¹²³ In other words, it could mean political ruin for the Conservative federal government to push the unpopular project on the province, given that the Conservatives require the support of the province in the next federal election.¹²⁴

B) Keystone XL: Federal government opinion and prerequisites for approval

Conversely, the United States federal government has been vocal and involved in the approval process of the Keystone XL pipeline project for political reasons. Polls have shown that the Keystone XL pipeline project has support amongst Americans, and this support is continuing to grow.¹²⁵ A January 2013 found that 59% of “likely US voters”¹²⁶ favoured the construction of the pipeline, while 28% were entirely opposed. Despite the fact that there is popular support for the project in America, Obama’s administration has been hesitant to grant a Presidential Permit for the pipeline for political reasons, in that granting the permit would antagonize Obama’s environmentalist supporters. Tackling environmental issues,

¹²² Forum Research Inc. *Opposition to Northern Gateway pipeline, coastal oil tanker traffic up sharply*. April 12, 2012.

[https://www.forumresearch.com/forms/News%20Archives/News%20Releases/01777_British_Columbia_-_Northern_Gateway_and_Tanker_Traffic_Issues_Poll_\(Forum_Research\).pdf](https://www.forumresearch.com/forms/News%20Archives/News%20Releases/01777_British_Columbia_-_Northern_Gateway_and_Tanker_Traffic_Issues_Poll_(Forum_Research).pdf) (Accessed July 30, 2013)

¹²³ *Harper defends independence of pipeline approval process*

¹²⁴ Fekete, Jason. *Pipeline protests spur companies to consider shipping oilsands crude by rail*. August 10, 2012.

<http://www.canada.com/business/Pipeline+protests+spur+companies+consider+shipping+oilsands+crude+rail/7072289/story.html> (Accessed July 30, 2013)

¹²⁵ McCown, Brigham, A. *Harris Poll: 82% of Americans Believe Keystone XL is in the National Interest*. July 6, 2013. <http://www.forbes.com/sites/brighammccown/2013/06/07/keystone-approval-rate-reaches-new-high/> (Accessed July 30, 2013)

¹²⁶ *Harris Poll: 82% of Americans Believe Keystone XL is in the National Interest*

such as climate change and the development of clean energy, are at the forefront of Obama's environmental policy.¹²⁷ Environmentalists and those against the Keystone XL project view Alberta's oil sands as a dirty source of oil.¹²⁸ Concerns have been raised that the construction of the pipeline will produce more greenhouse gas emissions resulting from the further development of the Alberta oil sands. Consequently, Obama has emphasized that the approval of the project requires evidence that the pipeline will not increase carbon pollution.

In a speech on his second-term environmental goals, Obama stated that the Keystone XL pipeline would be approved only if it is found that the project is in the national interest. President Obama stipulated that, in this case, national interest is dependent on a finding that the project "does not significantly exacerbate the problem of carbon pollution."¹²⁹ Obama's speech tied the approval of the project to the finding that the pipeline will not increase the oil sands' carbon emissions. The State Department's Draft SEIS has found that "approval or denial of the proposed Project is unlikely to have a substantial impact on the rate of development of the oil sands, or on the amount of heavy crude oil refined in the Gulf Coast area."¹³⁰ Even though the State Department found that the project would not be detrimental to environmentally sensitive areas, it is still awaiting approval for political reasons, and Obama's desire to appeal to his environmentally conscious supporters.

¹²⁷ The White House. *Energy, Climate Change and our Environment*. <http://www.whitehouse.gov/energy> (Accessed July 30, 2013)

¹²⁸ Oil & Gas Journal. *Repeal Sect. 526*. August 18, 2013 <http://www.ogj.com/articles/print/volume-111/issue-8b/regular-features/editorial/repeal-sect-526.html>. (Accessed August 22, 2013)

¹²⁹ Chase, Steven; Koring, Paul. *Canada seizes on Obama's Keystone XL pipeline requirements*. June 25, 2013. <http://www.theglobeandmail.com/report-on-business/industry-news/energy-and-resources/obama-climate-speech/article12799330/> (Accessed July 30, 2013)

¹³⁰ Department of State. *Draft Supplemental EIS* (2013), page 15

VIII. Conclusion

This paper has analyzed the nature of the Northern Gateway and Keystone XL pipeline disputes. Table 2 below summarizes the key economic, legal and political issues and questions analyzed. Although the Northern Gateway and Keystone XL disputes differ in terms of their causes, interjurisdictional pipeline disputes can be attributed to a problem of coordinating conflicting legal, political and economical goals. This lack of coordination has made it difficult for parties involved in the pipeline projects to agree to terms regarding the construction and continued operation of pipeline projects, resulting in the delayed approval of the projects.

Table 2: Framework summary		
	Interprovincial pipeline (Northern Gateway as an example)	International Pipeline (Keystone XL as an example)
Economic issues		
Economic importance of project	<ul style="list-style-type: none"> - Canada is a net exporter of petroleum products, and relies on the US as its major customer - It is important for Canada to diversify and gain access to alternative, emerging markets in Asia - Access to the Asian market means higher netbacks for producers 	<ul style="list-style-type: none"> - The US is a net importer of petroleum products, importing the majority of its oil from Canada - The US is becoming increasingly self-sufficient in terms of oil, displacing Canadian imports - Access to the PADD III region means higher netbacks for producers
Substitutability	<ul style="list-style-type: none"> - It is feasible, and profitable in terms of netbacks, to substitute rail transportation for pipeline transportation, but it is more expensive It costs \$7/bbl to transport Dilbit by pipeline via the Northern Gateway pipeline, and then by tanker to China - It costs between \$7 to \$9/bbl to transport Dilbit to China via railway and then by tanker. Raw bitumen costing between \$8 to \$11/bbl 	<ul style="list-style-type: none"> - The cost of shipping oil to the US Gulf Coast by rail ranges from \$15.50 to \$31/bbl. Conversely, it costs \$7/bbl to ship by pipeline - Depending on the price of oil, it may not be as feasible, or profitable in terms of netbacks, to substitute rail transport for pipeline transport
Tariffs and taxation	<ul style="list-style-type: none"> - British Columbia is not entitled to receive any royalties, and cannot legally impose any royalties on Alberta oil shipped to British Columbia via pipeline - British Columbia can raise property tax on oil pipelines - British Columbia can also impose an environmental levy 	<ul style="list-style-type: none"> - Canadian oil exports to the US cannot be taxed due to NAFTA, even if the US requests compensation for permitting the operation of the Keystone XL

	Interprovincial pipeline (Northern Gateway as an example)	International Pipeline (Keystone XL as an example)
Legal issues		
Jurisdiction	<ul style="list-style-type: none"> - Federal government has jurisdiction over pipelines, and this is constitutionally entrenched Federal government's jurisdiction over pipelines is constitutionally entrenched - Provinces do not have the power to block the project 	<ul style="list-style-type: none"> - Both the Canadian and US federal governments have jurisdiction to approve international pipelines - Coordinating federal government requirements for approval between the two nations may cause delays
Approval	<ul style="list-style-type: none"> - In Canada, the National Energy Board (NEB) and Joint Review Panel (JRP) review pipeline applications - Public interest is considered in granting approval, but is not clearly defined 	<ul style="list-style-type: none"> - In the US, the Secretary of State reviews international pipeline applications - National interest is considered in granting approval, but is not clearly defined - Divergence between Canadian and US national interest causes dispute
Political issues		
Federal Government Opinion	<ul style="list-style-type: none"> - Canadian federal government has jurisdiction over pipelines, but has been reluctant to intervene in the approval process for political reasons 	<ul style="list-style-type: none"> - Canadian federal government has approved Canadian section - US Federal government has jurisdiction over pipelines, and has been involved in the approval process for political reasons
Prerequisites for approval	<ul style="list-style-type: none"> - British Columbia's Premier Christy Clark has vowed to shut down the project if five demands are met - British Columbia does not have the ability to prevent the project if demands are not met 	<ul style="list-style-type: none"> - President Obama has stated that the project will be approved if the Keystone XL does not result in increased carbon pollution - Canada's priority is access to new markets and a higher price for oil, and so there is a dispute

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